REMARKS

Claims 1 and 3-15 remain in the application. Applicants acknowledge with appreciation the allowance of claims 13-15, but respectfully request reconsideration of the application and allowance of all claims in view of the following remarks,

The present invention is directed to a system of the type wherein a line termination element is connected to a plurality of network termination elements over a shared medium, and the line termination element is connected to a buffering element. The line termination element performs dynamic bandwidth allocation amongst the network termination elements. The buffering element will sometimes discard a cell sent to it from the line termination element, and the Background section of the present application points out that the discarding of a cell by the buffering element means that the sending of that cell from a network termination element to the line termination element was superfluous, and could have been avoided to save bandwidth between the line termination element and the network termination elements. To address this problem, the present invention provides for line termination element to communicate with the buffering element and cause the buffering element to adjust its cell input/output rate in accordance with at least one bandwidth related condition of a network termination element. In this way, transmissions from the network termination elements are anticipated by the buffering element, and none are discarded.

In Zheng, the Background discussion notes conventional Adaptive Bit Rate (ABR) systems wherein the transmission rate from an end system into the network is controlled in accordance with the state of the network to avoid excessive congestion of the network. Zheng

provides an improvement in this type of system by proposing the use of resource management cells in conjunction with an external processor.

In the anticipation rejection of claims 1, 3, 10 and 11 stated in paragraph 3 of the Office action, the examiner equates the destination end system 44 with the claimed plurality of network termination elements, but there is only one such system shown, and this single system is shown in Fig. 1 as including only a signal host. Thus, Zheng fails to teach a line termination element coupled to a plurality of network termination elements. The examiner refers to the memory 70 as being coupled to "other end system not shown in the ATM NETWORK 10," but Fig. 3 shows the memory 70 as being part of the single end system 64, and there is no suggestion that the memory 70 will serve a plurality of network termination elements. Further, and importantly, claim 1 of the present application describes the input/output rate of the buffering element as being adjusted in accordance with at least one bandwidth related condition of the network termination elements, which is just the opposite of Zheng where the transmissions from the end system are controlled in accordance with the congestion state of the network.

Thus, the present invention as defined in claims 1 and 3 contemplates a buffering element which is separated from network termination elements by a line termination element, and interactively adjusts the input/output rate of the buffer in accordance with a condition of the network elements, whereas Zheng does not teach the connection of a plurality of network termination elements to a buffering element through a single line termination element, and does not teach that the input/output rate of the buffering element is controlled in accordance with a

condition of the network termination elements. Accordingly, there is no anticipation of claims 1 and 3.

Claims 10 and 11 similarly contemplate a line termination element coupled to a plurality of network termination elements and allocating bandwidth amongst them. The examiner refers to receiver 85 as the claimed line termination element, but there is no suggestion anywhere in Zheng that the receiver 85 will allocate bandwidth amongst plural network termination elements. In addition, while the examiner again refers to the memory 70 as the claimed buffering element, Fig. 5 shows that the memory 70 is internal to one end system, and it cannot be used as a buffering element serving plural network termination elements. Accordingly, there is no anticipation of claims 10 and 11.

Claims 7-9 are also rejected for anticipation by Zheng. But Zheng is concerned only with adjusting the transmissions into the network and has no reason to evaluate conditions of the network termination elements and forward those to the buffering element. In addition, as discussed above, the memory 70 and network interface controller are both parts of a single end system, which at best corresponds to a single network termination element in the present case. Accordingly, there is no anticipation of claims 7-9.

The secondary references relied on in the obviousness rejections of claims 4-6 and 12 stated in paragraphs 5-7 of the Office action do not teach the features of the independent claims lacking in Zheng, so claims 4-6 and 12 are believed to patentably distinguish over the prior art at least due to their dependence on patentable parent claims.

REQUEST FOR RECONSIDERATION
U.S. APPLICATION NO. 09/925,331

In view of the above, reconsideration and allowance of this application are now believed

to be in order, and such actions are hereby solicited. If any points remain in issue which the

Examiner feels may be best resolved through a personal or telephone interview, the Examiner is

kindly requested to contact the undersigned at the telephone number listed below.

An extension of time is requested, and the required fee is being separately authorized

through the Electronic Filing System (EFS). The USPTO is directed and authorized to charge all

required fees, except for the Issue Fee and the Publication Fee, to Deposit Account No. 19-4880.

Please also credit any overpayments to said Deposit Account.

Respectfully submitted,

_____/DJCushing/_____

SUGHRUE MION, PLLC   David J. Cushing
Telephone: (202) 293-7060   Registration No. 28,703
Facsimile: (202) 293-7860

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